IN THE CLAIMS

Please enter claims 1, 3, 8-10, 106, and 107 as re-written below.

1. (Currently amended) A method for isolating a polypeptide of interest comprising[;]:

a) contacting a modified Fluorescein arsenical helix binder (FlAsH) compound, which has been modified by acylation with an amino acid, or a tautomer, anhydride or salt of said modified FlAsH compound, immobilized on a solid support with a solution containing a polypeptide of interest, which has been modified to contain a FlAsH target sequence motif, under conditions that allow binding of the polypeptide to the immobilized FlAsH compound; and

b) eluting the polypeptide of interest from the immobilized FlAsH compound.

2. (Canceled)

3. (Currently amended) The method of claim [2] 1, wherein the modification is by acylation with β-Alanine.

4. (Previously amended) The method of claim 1, wherein the polypeptide of interest has been modified by the addition of the FlAsH target sequence motif C-C-X_1-X_2-C-C (SEQ ID NO:1), where X_1 and X_2 are any amino acid.

5. (Original) The method of claim 4 wherein X_1 and X_2 are the same amino acid.

6. (Original) The method of claim 4 wherein X_1 and X_2 are different amino acids.

7. (Original) The method of claim 4 wherein the sequence motif has been added at either the N terminus or C terminus of the polypeptide, or in an alpha-helical region of the polypeptide.

8. (Currently amended) The method of claim 1, wherein said solid support is selected from the group consisting of agarose, [polyacrylimide] polyacrylamide, glass, ceramics, natural or synthetic polymeric materials, beads, [coverslips] cover slips, paper, metals, metalloids, polacryloylmorpholide, polyamide, poly(tetrafluoroethylene), polyethylene, polypropylene, poly(4-methylbutene), [polystyrene,] polystyrene, polystyrene/latex, polymethacrylate, poly(ethylene terephthalate), rayon, nylon, poly(vinyl butyrate), polyvinylidene difluoride (PVDF), silicones, polyformaldehyde, cellulose, cellulose acetate, nitrocellulose, and controlled-pore glass, aerogels, and affinity exchange resins.

9. (Currently amended) The method of claim 1, wherein the polypeptide of interest is eluted from the immobilized FlAsH compound using a dithiol solution.

10. (Currently amended) The method of claim 9, where the dithiol solution is selected from the group consisting of 1,2 Ethanedithiol (EDT), [Dithiotheritol] dithiothreitol (DTT), [2,3] and 2,3-Dimercaptopropanesulfonate (DMPS).

11. (Original) The method of claim 1, wherein said solution which contains the polypeptide of interest is selected from the group consisting of cell lysate, crude polypeptide extract, and partially purified polypeptide extract.

12. (Original) The method of claim 11, wherein said solution is obtained from a cell or cell free solution derived from the group consisting of a plant, a prokaryote, and a eukaryote.

13-103. (Canceled)

104. (Previously added) The method of claim 1, wherein the modified FlAsH compound comprises 4'5'-bis(1,2,3-dithioarsolan-2yl)5-((5-aminoethyl)aminocarbonyl-fluorescein.

105. (Previously added) The method of claim 1, wherein the modified FlAsH compound is immobilized on a solid support by reaction with an N-hydroxysuccinamide (NHS) functionalized solid support.

106. (Currently amended) The method of claim 1, wherein the modified FlAsH compound has been modified at a primary amine of a 5 position of flourescein, by acylation with an amino acid[,].

107. (Currently amended) A method for isolating a polypeptide of interest comprising;

a) contacting a modified Fluorescein arsenical helix binder (FlAsH) compound, which has been modified by acylation with an amino acid, or a tautomer, anhydride or salt of said modified FlAsH compound, immobilized on a solid support with a solution containing a polypeptide of interest, which has been modified to contain a FlAsH target sequence motif, under conditions that allow binding of the polypeptide to the immobilized FlAsH compound, wherein the solid support is selected from the group consisting of agarose, [polyacrylimide] polyacrylamide, glass, ceramics, natural or synthetic polymeric materials, beads, [coverslips] cover slips, paper, metals, metalloids, polacryloylmorpholide, polyamide, poly(tetrafluoroethylene), polyethylene, polypropylene, poly(4-methylbutene), polystyrene, [polystyrene,] polystyrene/latex, polymethacrylate, poly(ethylene terephthalate), rayon, nylon, poly(vinyl butyrate), polyvinylidene difluoride (PVDF), silicones, polyformaldehyde, cellulose, cellulose acetate, nitrocellulose, and controlled-pore glass, aerogels, and affinity exchange resins; and

b) eluting the polypeptide of interest from the immobilized FlAsH compound.

108. (Previously added) The method of claim 107, wherein the modification is by acylation with β-alanine.

109. (Previously added) The method of claim 107, wherein the modified FlAsH compound is immobilized on a solid support by reaction with an N-hydroxysuccinamide (NHS) functionalized solid support.

110. (Previously added) The method of claim 109, wherein the NHS functionalized solid support comprises NHS functionalized agarose beads.

111. (Previously added) The method of claim 107, wherein the modified FlAsH compound comprises 4'5'-bis(1,2,3-dithioarsolan-2yl)5-((5-aminoethyl)aminocarbonyl-fluorescein.